tomy was performed. The patient made uneventful recovery.

The pathological report was "Cyst, pancreas, simple obstructive; cholecystitis, subacute; lymphadenitis, regional."

DISCUSSION

In retrospect it might be said that in each of the two cases presented the clinical history might have indicated the true nature of the disease and that the suspicion of carcinoma of the head of the pancreas was unwarranted. Experience has shown, however, that the clinical history is not always to be trusted and that carcinoma of the common duct, carcinoma of the ampulla of Vater and carcinoma of the head of the pancreas may be associated with painless intermittent jaundice, painless constant jaundice and painful intermittent jaundice. Moreover, the pathological findings in each of these cases make it evident that the true nature of the disease could not be determined by gross examination at the time of operation.

SUMMARY

Two cases of pancreatic cyst causing obstructive jaundice are reported.

Partial pancreaticoduodenectomy was performed in both cases, leading to complete relief of symptoms.

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Anaphylactic Shock Following Intravenous Administration of Thiamine Chloride

Report of a Case

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RECENTLY, severe reactions to vitamin preparations have been reported in the medical literature.[2, 3, 4, 5, 6, 7] Since these substances are currently popular and are used extensively, and as they may be potentially dangerous when employed indiscriminately, it is fitting to bring forth periodically for consideration by the medical profession certain representative cases of sensitization and to sound a word of caution.

CASE REPORT

A 39-year-old male had been given two intravenous injections of thiamine chloride for pain in the left shoulder by his wife, a nurse. After the second injection, the patient wheezed and noted some pruritus which disappeared shortly.

At 7 p.m. June 6, 1947, about four months after the second injection, a third injection of 10 mg. of thiamine chloride was administered intravenously. Within two or three minutes, the patient experienced difficulty in breathing and became cyanotic. The skin became cold and moist. The patient then started to wheeze, cough, and expectorate mucus and bloody sputum. He complained of pain in the chest and abdomen. He was hospitalized within an hour, and at this time the skin was ashen. The lungs were full of musical and coarse bubbling rales and coarse rhonchi. The blood pressure was 70 mm. of mercury systolic and 40 mm. diastolic, the pulse rate was 120, respirations 28 per minute, and rectal temperature 97° F. Blood plasma, epinephrine, and oxygen were given immediately. Around 10 p.m. copious, bloody, liquid stools were being passed and the blood pressure was unobtainable. Therapy was continued, and adrenal cortical hormone, vitamin K, and atropine sulfate were added. By 1 a.m. on June 7 the patient's color and pulse had improved, and 5 per cent dextrose in normal saline was substituted for the plasma. At 4 a.m. he was much improved, the blood pressure was 98 mm. of mercury systolic and 70 mm. diastolic, and the pulse rate was 108. The bloody diarrhea and some abdominal cramping persisted, but they seemed relieved by Kaopectate® orally. By noon on June 7, the lungs had cleared, the color of the skin was normal, and the blood pressure was 128 mm. of mercury systolic and 80 mm. diastolic. Later in the afternoon a tarry stool was passed. Up to that time the patient had been given 1,500 cc. of blood plasma, 1,000 cc. of 5 per cent dextrose in normal saline, and 3 cc. of 1:1,000 epinephrine, most of which had been given in the first five hours after entry.

On June 8, 1947, 36 hours after the thiamine chloride injection, the pulse, temperature, respirations, and blood pressure were normal. The patient was taking water by mouth, and was able to breathe outside the oxygen tent without difficulty. He was discharged on June 10 ambulatory and asymptomatic with no gross evidence of blood in the stool.

Subsequent intradermal or passive transfer tests were not carried out. At last report a year later, the patient had remained in good health. There was no history of previous allergic disease in the patient or in his family.

COMMENT

The profound reaction of this patient to parenteral thiamine chloride was more severe than usual, although deaths from anaphylactic shock have resulted from the use of this drug. The many symptoms are indicative of the widespread involvement of the tissues affected in shock. In addition to circulatory collapse, there was clinical bronchial asthma with pulmonary edema and massive hemorrhage into the gastrointestinal tract. In a case reported by Reingold and Webb[5] microscopic changes noted at autopsy included constriction of the smooth muscle of the pulmonary arteries and bronchioles, which was accompanied by pulmonary engorgement, dilatation of the right side of the heart, and pulmonary emphysema. The presence of pigmented macrophages was thought to indicate that previous hemorrhages had followed an anaphylactizing injection. The veins and sinusoids of the visceral organs were found to be engorged with blood.

In spite of the potential danger of administering vitamin preparations by injection, especially intravenously, apparently this method of administration is widely used. Although such injections may be necessary in selected patients and of psychic advantage in some instances, the oral route remains the cheapest and safest for the great majority of patients.

Every prospective recipient of parenteral vitamin preparations should be quizzed as to sensitivities and reaction to previous similar injections. In addition the use of intracutaneous tests may indicate hypersensitivity to the substances. Even during the using of them, such symptoms as sneezing, wheezing, pruritus, nausea, vomiting, swelling, shortness of breath, nervousness, tachycardia, and collapse should indicate impending danger and perhaps a change in the route of administration of the preparation.

Necessary treatment of reactions depends on the severity of them. In the case here reported, parenteral antihistaminic drugs, which were not available at the time, would have been indicated, in addition to the measures used. In less fulminating cases, epinephrine has proved adequate.[1, 5]

SUMMARY

A case of anaphylaxis following the intravenous injection of 10 mg. of thiamine chloride is presented. The importance of determining sensitivity prior to parenteral administration of the substance is stressed. Oral administration of vitamins is the safest and preferable in a great majority of subjects. Anaphylactic shock was successfully treated with epinephrine, oxygen, blood plasma, and atropine.

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Allergic Parotitis

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THIS report is offered as further evidence that structures other than the respiratory tract, the gastrointestinal tract and the skin are subject to allergic disturbance. Such is the case in allergic disease of the parotid glands which, since first reported in 1925,[2] has been noted frequently.

Allergic parotitis affects all age groups. Cases in patients as old as 70[8] and as young as 2½ years[10] have been reported. Frequently a family history of allergic disease is noted.[10] Associated allergic disease has been observed in most well documented cases[3, 11, 12] and the presence of it certainly strengthens the diagnosis. Asthma,[8, 9, 11] urticaria, angioneurotic edema and allergic rhinitis[3, 5, 9, 12] all occur in conjunction with this condition. Specific sensitivities are varied but most patients who have the disease are sensitive to environmental allergens and to certain foods. Allergic reaction to pollens, however, is infrequently reported.[11] Sometimes an item of food will specifically precipitate an attack[12] but a seasonal history has not been reported. In the typical case, acute swelling develops either in relation to meals or upon arising in the morning. The importance of the inhalant factor may be observed in a case reported by Zindler and Frazer[12] in which attacks were precipitated when the patient handled live turkeys. In a case observed by the author, swelling developed when the patient opened a trunk full of old clothes.

The parotid swelling may involve one or both sides.[6, 12] It develops quite rapidly and lasts for from a few hours to several days. Pain is infrequent but patients may complain of a tense feeling in the cheeks, occasionally in the ears, and inability to open the jaws completely. Edema of the gland, the duct or both may occur[11] and some patients experience immediate relief following a spurt of saliva into the mouth. When examined during an attack, the gland is palpable but usually soft and non-tender. The orifice of Stensen's duct does not appear abnormal and clear saliva may be milked out. A stained smear of parotid secretion will often show many eosinophils, although their presence is not essential for diagnosis. X-ray studies of the area should be carried out in all cases, but instillation of Lipiodol® is indicated only when the diagnosis remains in doubt. Prompt response to epinephrine or an antihistaminic drug is strongly indicative of allergic reaction as a cause for the symptoms.[2, 6, 10, 12]

Differential diagnosis should not prove difficult in most cases of intermittent, painless parotid swelling of allergic origin, but iodine medication may be overlooked as a causative agent. Although the swelling may be the result of low-grade infection, in such cases pain and purulent secretions usually develop during the course of the disease. Mumps should offer no problem in differentiation, although a recurrent type of swelling associated with low-grade fever and lymphocytosis is reported in children.[1] Tumors, calculi and Mikulicz's disease secondary to sarcoid, lymphomata, etc., are distinguishable by characteristic findings. Cases of recurrent parotitis with no determinable cause have been reported,[4, 7] and it is conceivable that they might have been explained on a basis of allergic reaction had attention been drawn to the possibility.

Treatment of allergic parotitis consists principally of desensitization with specific allergens as determined by skin testing and substantiated by a careful history of allergic reactions. Significant foods should be eliminated from the diet whether the evidence of their culpability arises from the history or from the skin tests. Antihistaminics appear to be of non-specific, symptomatic value. The use of iodides for concurrent asthma is not advisable.

CASE REPORTS

CASE 1: A 49-year-old woman, the wife of a physician, was first observed by the author in May 1942. At that time she had had migraine for 15 years and angioneurotic edema and hay fever from which she had been free for five or six years. Since the fall of 1941, she had had bronchial asthma almost continuously. Associated with it were sneezing, stuffiness of the nose and itching of the ears. The patient noted that the symptoms subsided when she left her home in the San Fernando Valley and visited Los Angeles. One week previously, after years of relief, a combination of urticaria and angioneurotic edema involving the entire body developed suddenly. The condition lasted three days and subsided spontaneously.

There were no other significant symptoms except that, although the patient had no food dislikes, she had abdominal cramps and diarrhea whenever she ate peaches. She also noted that certain toothpastes caused her lips to swell. Her mother, father, three siblings and two children all had hay fever. There were no animals about the house and she used feather pillows.

Physical examination showed the nasal mucous membrane to be pale and edematous, the turbinates hypertrophied. Airspaces were ample and there was little discharge. No polypi were observed. The chest was clear except for occasional faint wheeze on expiration. No other abnormalities were noted. Complete tests disclosed pronounced reactions to significant pollens, epidermal materials, and foods. Treated perenially with alternating spring and fall pollens, advised as to environmental control and given a list of foods to eliminate from the diet, the patient since has been free of asthma and only rarely has mild, evanescent rhinitis and urticaria.

In 1946, swelling in the right parotid region developed suddenly while the patient was eating lunch. This subsided in three hours. Since then, the swelling has recurred four to five times a week, usually during or immediately after meals, especially breakfast. Associated with it is an odd stiff sensation of the cheek but no pain. Occasionally the right ear becomes plugged as well. The patient found that massaging the parotid area increases the swelling. Occasional sudden relief has occurred, accompanied by a spurt of saliva into the mouth. By careful observation, the patient has incrim-

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